

AQRP Monthly Technical Report

PROJECT TITLE	New Satellite Tools to Evaluate Emission Inventories: Is a 3-D Model Necessary?	PROJECT #	20-020
PROJECT PARTICIPANTS	University of Wisconsin – Madison Ramboll	DATE SUBMITTED	9/8/2020
REPORTING PERIOD	From: August 1, 2020 To: August 31, 2020	REPORT #	1

A Financial Status Report (FSR) and Invoice will be submitted separately from each of the Project Participants reflecting charges for this Reporting Period. I understand that the FSR and Invoice are due to the AQRP by the 15th of the month following the reporting period shown above.

Detailed Accomplishments by Task for reporting period

The Ramboll team paused work after receiving a stop work order on Project 20-020 on August 4 and resumed work on Task 1 after receiving notice to proceed on August 21.

Task 1: Simulate NO₂ and SO₂ amounts with the high-resolution WRF-CAMx model

The Ramboll modeling team continued project planning and development of the 2019 WRF-CAMx modeling platform. As part of this work, Ramboll processed CEM data for 2019.

Task 2. Compare model simulations with TROPOMI and near-surface observations

Task 2 has not yet been initiated.

Task 3. Compare satellite data and emissions for power plants and urban areas

Task 3 has not yet been initiated.

Task 4. Evaluate mobile emissions assessments performed with and without

Task 4 has not yet been initiated.

Preliminary Analysis

None.

Data Collected

None.

Identify Any Problems or Issues Encountered and Proposed Solutions or Adjustments

None.

Goals and Anticipated Issues for the Succeeding Reporting Period

Continue developing 2019 WRF-CAMx modeling platform by processing EGU and MEGAN biogenic emissions. Develop boundary conditions and other model-ready inputs for 2019 WRF-CAMx simulation.

Detailed Analysis of the Progress of the Task Order to Date

None.

Do you have any publications related to this project currently under development? If so, please provide a working title, and the journals you plan to submit to.

Yes No

Do you have any publications related to this project currently under review by a journal? If so, what is the working title and the journal name? Have you sent a copy of the article to your AQRP Project Manager and your TCEQ Liaison?

Yes No

Do you have any bibliographic publications (ie: publications that cite the project) related to this project that have been published? If so, please list the reference information. List all items for the lifetime of the project.

Yes No

Do you have any presentations related to this project currently under development? If so, please provide working title, and the conference you plan to present it (this does not include presentations for the AQRP Workshop).

Yes No

Do you have any presentations related to this project that have been published? If so, please list reference information. List all items for the lifetime of the project.

Yes No

Have any personnel changes occurred that were not listed in the original proposal? If so, please include a detailed description of the personnel change(s) below.

Yes No

Are any delays expected in the progress of the research? If so, please include a detailed description of the potential delay below.

Yes No

Describe any possible concerns/issues (technical or non-technical) that AQRP should be made aware of.

None.

Are you anticipating using all the available funds allocated to this project by the end date? If not, why and approximately what is the amount to be returned?

Yes No

Submitted to AQRP by Jeremiah Johnson

Principal Investigator Tracey Holloway